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US EPA Region VIII
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Denver, Colorado 80202-2466

May 8, 2006

SENT BY CERTIFIED MAIL
RETURN RECEIPT REQUESTED

CONSENT DECREE
CIVIL ACTION NO. CV 98-3-H-CCL
EAST HELENA SITE
WORK PERFORMED IN APRIL 2006
PROGRESS REPORT #97

Dear Ms. Jacobson:

On May 5, 1998, Asarco and the United States Environmental Protection Agency (EPA) entered into a Consent Decree (Decree) to further the objectives of the Resource Conservation and Recovery Act (RCRA) and the Clean Water Act (CWA). Section XI of the Decree (Reporting: Corrective Action) requires Asarco to submit certified monthly progress reports to EPA which discuss the actions taken by Asarco in achieving compliance with the Decree. The reports are to be submitted to EPA no later than the twentieth (20<sup>th</sup>) day of the following month. The following describes only those activities that have occurred or are related to projects performed during April 2006. The historical actions taken by Asarco is achieving compliance with the Decree are contained in previous monthly progress reports.

a. Describe the actions, progress, and status of projects which have been undertaken pursuant to Part VII of the Decree;

In a letter dated April 17, 2006, EPA provided Asarco with the comments on the November 2005 Interim Measures Work Plan from the technical experts at EPA's Office of Research and Development. In May 2006, Asarco is scheduled to provide EPA with responses to these comments.

In a March 28, 2006 meeting between Asarco, EPA, and the Montana Department of Environmental Quality (MDEQ), Asarco learned of EPA's preliminary decision to grant approval for construction of a CAMU Phase 2 cell, pending acquisition of

financial assurance. On April 19, 2006, Asarco submitted a formal letter requesting EPA's final approval.

On April 25-26, 2006, Asarco, EPA, and MDEQ technical representatives met in Denver, Colorado (and through video conferencing) to discuss the Montana and RCRA Consent Decree programs. The meeting provided an excellent opportunity to advance specific and detailed discussions on projects related to 1) the completion of the cleaning and demolition activities for process units located within the East Helena Plant and 2) the examination of groundwater source controls, long-term goals to address the narrow arsenic plume, and management of off-site boundary migration. A list of action items, including responsible parties and projected completion dates, was prepared at the conclusion of the meeting. A copy of the action item list is attached to this monthly progress report.

Asarco has contracted Camp Dresser and McKee Incorporated (CDM) and Hydrometrics Incorporated to complete an independent evaluation and full-scale pilot test of a pump and treat alternative for addressing groundwater source control at the East Helena smelter. In an April 14, 2006 letter, EPA requested that Asarco provide the results of each completed phase of the pump and treat pilot test. To date, the groundwater modeling, well sampling and analysis, and water treatability modeling have been completed. The major conclusions derived from these activities are summarized below.

- Groundwater modeling in the speiss granulating area showed that three wells pumping at a rate of 15 gpm each (total flow of 45 gpm) would provide total capture of the high arsenic plume from an area 230 feet wide. The modeling indicates that installation of an infiltration trench downgradient of the speiss area provides no real benefit for improving the capture of high arsenic groundwater. A copy of the Groundwater Capture Well Model Report (Hydrometrics) is attached to this monthly progress report.
- Well sampling and analysis was completed from wells in the speiss granulating area (DH-34), acid plant sediment drying area (ASPD-2), and from storm water sources. This water will be used for bench scale testing. The analytical results from the groundwater obtained from the speiss granulating area indicated high pH (10.2) and contained elevated arsenic concentrations of 223 mg/L, mostly in the form of As (III). The analytical results from groundwater collected from the acid sediment drying area contained neutral pH with an arsenic concentration of about 23 mg/L. The plant storm water contained nominal pH and metal constituents. The Energy laboratory analytical report for these three water sources is attached to this monthly progress report.
- Water treatability modeling was completed to determine the steps necessary for treatment of all three sources of water in the High Density Sludge (HDS) water treatment plant. The modeling indicates that treatment of speiss granulating area water will be the most difficult and ultimately determine the

final treatment process. The preliminary results indicate that only minor modifications to the HDS water treatment plant will likely be required to meet discharge limits. The flow diagrams for the HDS water treatment plant (both current and preliminary pump and treat) are attached to this monthly progress report.

- Bench scale testing is currently underway and on schedule.
- Equipment setup and full-scale pilot testing are pending completion of the evaluation of the bench scale testing. CDM does not anticipate any delays or changes in scheduled activities during May 2006.

A summary of the correspondence transmitted as part of the East Helena Consent Decree in April 2006 is included in Attachment 1.

b. Identify any requirements under the Part VII of the Decree that were not completed in a timely manner, and problems or anticipated problem areas affecting compliance with the Decree;

There were no requirements that were not completed in a timely manner nor were there problems or anticipated problem areas that affect compliance with the Decree.

c. Describe projects completed during the prior month, as well as activities scheduled for the next month;

In accordance with the March 2000 Groundwater Source Control Interim Measures Design Analysis, Plans, and Specification report, the speiss handling area and the former acid plant sediment drying area are being inspected monthly with the last inspection occurring on April 3, 2006. This monthly inspection documented the condition of the interim measures within these two areas.

CAMU Landfill - The construction of the CAMU landfill is complete. The Final Construction Report for the CAMU-Phase 1 Cell was hand-delivered to EPA on January 23, 2002. In accordance with the July 2000 CAMU Design Analysis Report (Operation and Maintenance Plan), the CAMU is being inspected monthly with the last inspection occurring on April 4, 2006. This monthly inspection documented the condition of the CAMU.

During May 2006, Asarco will initiate work to complete the tasks outlined in the April 25-26, 2006 action item list. Asarco, (through the work of CDM and Hydrometric) is scheduled to continue the tasks outlined in the final Pump and Treat Pilot Test study, with particular emphasis on water treatability modeling and bench scale testing. Finally, Asarco is scheduled to conduct the semi-annual sampling of the designated monitoring wells and surface water site and the annual sampling of residential groundwater wells as prescribed in Asarco's on-going Post

Remedial Investigation (RI)/Feasibility Study (FS), Long Term Monitoring Program.

#### d. Describe and estimate the percentage of studies completed;

The Pump and Treat Pilot Scale Testing for Source Area Reduction of Groundwater Contamination is approximately 40% complete.

### e. Describe and summarize all findings to date;

The details of past findings through March 2005 are described and summarized in previous monthly progress reports.

### f. Describe actions being taken to address problems;

There were no actions taken to address problems associated with the Decree.

### g. Identify changes in key personnel during the period;

Asarco continues to use the services of Asarco Consulting Incorporated and Hydrometrics Incorporated to perform the various activities required under the Consent Decree. The Consent Decree activities will continue to be administrated under the direction of Robert Miller.

h. Include copies of the results of sampling and tests conducted and other data generated pursuant to work performed under Part VII of the Decree since the last Progress Report. Asarco may submit data that has been validated and confirmed by Asarco to supplement any prior submitted data. Updated validated and confirmed data shall be included with the RFI Report, if not delivered before;

The Energy Laboratory raw analytical results obtained from samples collected in the acid plant sediment drying area (APSD-2), speiss granulating areas (DH-34) and storm water as part of the Pump and Treat Pilot Scale Testing for Source Area Reduction of Groundwater Contamination are attached to this monthly progress report.

i. Describe the status of financial assurance mechanisms, including whether any changes have occurred, or are expected to occur which might affect them, and the status of efforts to bring such mechanisms back into compliance with the requirements of this Decree.

ASARCO filed a voluntary petition for relief under chapter 11 of Title 11 of the United States Bankruptcy Code in the Southern District of Texas on August 9, 2005. ASARCO hopes to use its chapter 11 bankruptcy proceeding to improve its financial position to the point where it can successfully reorganize and immerge

from bankruptcy. ASARCO further hopes that at that time it will be in a position to make the required financial assurance demonstration.

Sincerely,

Jon Nickel

Denise A. Kirkpatrick, MDEQ Cc:

## CERTIFICATION PURSUANT TO U.S. v ASARCO INCORPORATED (CV-98-3-H-CCL, USDC, D. Montana)

I certify under penalty of law that this document, April 2006 Progress Report and all attachments, were prepared under my direct supervision in accordance with a system designed to assure that qualified personnel gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine or imprisonment for knowing violations.

Signature

Name: Thomas L. Aldrich

Title: Vice President Environmental Affairs

Date: May 8, 2006

# CONSENT DECREE EAST HELENA SITE APRIL 2006 PROGRESS REPORT

### SUMMARY OF CORRESPONDENCE ATTACHMENT 1

DATE OF TRANSMITTAL	CORRESPONDENCE SENT FROM	CORRESPONDACE SENT TO	SUBJECT	RESPONSE
April 19, 2006	Tom Aldrich	Linda Jacobson	Letter Requesting Approval of	Awaiting EPA
			CAMU Phase 2 Cell Pump -	Response
			East Helena Plant	
Attached to This	Tom Aldrich	Linda Jacobson	April 25-26, 2006 Technical	No Formal Response
Progress Report			Meeting Action Item List	Required
Attached to This	Tom Aldrich	Linda Jacobson	Groundwater Capture Well	No Formal Response
Progress Report		·	Model Report (Hydrometrics)	Required
Attached to This	Tom Aldrich	Linda Jacobson	Energy Laboratory Report for	No Formal Response
Progress Report			DH-34, APSD-2, and Storm	Required
			Water Samples	
Attached to This	Tom Aldrich	Linda Jacobson	Flow Diagrams for the HDS	No Formal Response
Progress Report			Water Treatment Plant (Current	Required
			and Preliminary Pump and	-
			Treat)	

### Asarco/EPA/MDEQ Meeting April 25- 26, 2006 Action Items

Action Item	Responsible	Projected
	Party	Completion Date
Evaluate applicability of CFR 264.1101 (c)(ii) to Coverall Storage Building	MDEQ, letter of findings to Asarco/EPA	May 2006
Determine waste volumes for sinter plant, dross plant, blast furnace flueand analyze for temporary storage while awaiting CAMU construction	Asarco, with findings to EPA/MDEQ	May - June 2006
Issue conditional approval for CAMU construction, pending financial assurance demonstration from Asarco	EPA, letter to Asarco/MDEQ	May 2006
Provide financial assurance response for CAMU construction	Asarco, letter to EPA/MDEQ	2 Weeks following EPA conditional approval letter
Determine agency primacy moving forward on cleaning/demolition work plan	EPA/MDEQ, letter with findings to Asarco	May 2006
Develop concrete debris temporary storage plan	Asarco, with input from MDEQ	May 2006
Provide HDS water treatment plant flow diagram, current and pump/treat scheme	Asarco, e-mail and hardcopy	April 2006
Develop water control plan for structures demolished in 2006	Asarco, with findings to EPA/MDEQ	May 2006
Provide existing CAMU construction design report (July 2000). Prepare design report addendum for new CAMU that references existing approved liner and cap designs and includes detailed waste volume determination, construction schedule, and costs for the CAMU.	Asarco, report to EPA/MDEQ	May 2006, with refinements in August-September 2006
Refine speiss area slurry wall construction and capping costs, with assistance from outside contractors	Asarco, with findings to EPA/MDEQ	May 2006
Develop acid plant sediment drying area excavation and soil mixing costs, with assistance from outside contractors	Asarco, with findings to EPA/MDEQ	May 2006
Provide pump and treat pilot-scale findings	Asarco, findings to EPA/MDEQ	May 2006 and status updates in monthly reports
Provide updated RFI data and geo-logs for well monitoring construction	Asarco and EPA, copies to Steve Acree	May 2006

Develop PRB construction and cost refinements for shallow groundwater control, with assistance from outside contractors (GeoSierra and others) through site visit and discussions. Examine:	Asarco, with support from Randy Breeden and Steve Acree	May and June 2006
<ul> <li>Excavation techniques: (Shaw and/or others)</li> <li>Define wall length (additional monitoring wells</li> </ul>	Asarco, with findings to EPA/MDEQ	<ul><li>May 2006</li><li>July-August 2006</li></ul>
<ul> <li>Examine funnel and gate options</li> <li>Examine alternative media to ZVI</li> </ul>	↓ ↓	<ul><li>May 2006</li><li>May 2006</li></ul>
Provide Interim Measures response to EPA April comments	Asarco, with letter to EPA/MDEQ	May 2006
Verify that cleaning/demolition of dross plant (source control task) qualifies for Trust Fund reimbursement	EPA, with findings to Asarco/MDEQ	May 2006
Prepare 2006 budget including anticipated Trust Fund expenditures	Asarco, with findings to EPA/MDEQ	May-June 2006
Develop site wide cap design alternatives and costs	Asarco, with findings to EPA/MDEQ	2006 and 2007
Prepare Controlled Groundwater Use Designation package for submittal to DNRC	Asarco, with package to EPA/MDEQ	2007 and 2008
Update Montana Decree 2006 Work Plan to incorporate dross plant demolition and CAMU construction	Asarco/MDEQ, with revised work plan to EPA	June 2006